## AU 1644

BATCH

RAW SEQUENCE LISTING DATE: 10/11/2000 PATENT APPLICATION: US/09/522,752 TIME: 10:58:23

Input Set : A:\1855.1064003.TXT

Output Set: N:\CRF3\10112000\I522752.raw

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4 <110> APPLICANT: Andrew, David P.
                Zabel, Brian A.
                Ponath, Paul D.
         <120> TITLE OF INVENTION: ANTI-GPR-9-6 ANTIBODIES AND METHODS OF
                IDENTIFYING MODULATORS OF GPR-9-6 FUNCTION
      12 <130> FILE REFERENCE: 1855.1064-003
     14 <140> CURRENT APPLICATION NUMBER: US 09/522,752
C--> 15 <141> CURRENT FILING DATE: 2000-05-10
     17 <150> PRIOR APPLICATION NUMBER: US 09/266,464
18 <151> PRIOR FILING DATE: 1999-03-11
      20 <160> NUMBER OF SEQ ID NOS: 15
      22 <170> SOFTWARE: FastSEQ for Windows Version 4.0
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      25 <211> LENGTH: 2577
      26 <212> TYPE: DNA
      27 <213> ORGANISM: Homo sapiens
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      35
                                                                                  Met
      36
      38 gct gat gac tat ggc tct gaa tcc aca tct tcc atg gaa gac tac gtt
                                                                                          108
      39 Ala Asp Asp Tyr Gly Ser Glu Ser Thr Ser Ser Met Glu Asp Tyr Val
                       5
                                               10
      42 aac ttc aac ttc act gac ttc tac tgt gag aaa aac aat gtc agg cag
                                                                                          156
     43 Asn Phe Asn Phe Thr Asp Phe Tyr Cys Glu Lys Asn Asn Val Arg Gln
44 20 25 30
      46 ttt gcg age cat ttc ctc cca ccc ttg tac tgg ctc gtg ttc atc gtg
     47 Phe Ala Ser His Phe Leu Pro Pro Leu Tyr Trp Leu Val Phe Ile Val
48 35 40 45
     50 ggt gcc ttg ggc aac agt ctt gtt atc ctt gtc tac tgg tac tgc aca 51 Gly Ala Leu Gly Asn Ser Leu Val Ile Leu Val Tyr Trp Tyr Cys Thr
                                                                                          252
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                                                                                          300
      54 aga gtg aag acc atg acc gac atg ttc ctt ttg aat ttg gca att gct
     55 Arg Val Lys Thr Met Thr Asp Met Phe Leu Leu Asn Leu Ala Ile Ala 56 70 75 80
                          70
                                                 75
      58 gac etc etc ttt ett gte act ett ecc tte tgg gee att get get
                                                                                          348
      59 Asp Leu Leu Phe Leu Val Thr Leu Pro Phe Trp Ala Ile Ala Ala Ala
                     85
                                             90
                                                                      95
     62 gac cag tgg aag ttc cag acc ttc atg tgc aag gtg gtc aac agc atg
63 Asp Gln Trp Lys Phe Gln Thr Phe Met Cys Lys Val Val Asn Ser Met
                                                                                          396
                                         105
                                                                110
                 100
     66 tac aag atg aac ttc tac agc tgt gtg ttg ctg atc atg tgc atc agc 67 Tyr Lys Met Asn Phe Tyr Ser Cys Val Leu Leu Ile Met Cys Ile Ser
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120



## ENTERED

115

RAW SEQUENCE LISTING DATE: 10/11/2000 PATENT APPLICATION: US/09/522,752 TIME: 10:58:23

Input Set : A:\1855.1064003.TXT
Output Set: N:\CRF3\10112000\1522752.raw

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														cat			492	
		Asp	Arg	Tyr	Ile	Ala 135	Ile	Ala	Gln	Ala	Met 140	Arg	Ala	His	Thr	Trp 145		
	130 agá	nan	aaa	agg	ctt		tac	age	aaa	atα		tac	+++	acc	atc		540	
75	Arq	Glu	Lvs	Arq	Leu	Leu	Tyr	Ser	Lys	Met	Val	Cys	Phe	Thr	Ile	Trp		
76					150		-		•	155		-			160	-		
78	gta	ttg	gca	gct	gct	ctc	tgc	atc	cca	gaa	atc	tta	tac	agc	caa	atc	588	
	Val	Leu	Ala		Ala	Leu	Cys	Ile		Glu	Ile	Leu	Tyr	Ser	Gln	Ile		
80				165					170			~ + +	+	175		~~ n #	636	
														cct Pro			0.30	
84	цуѕ	GIU	180	ser	GLY	TTE	міа	185	Cys	TIII	met	Val	190	FIU	Jer	Yab		
	gag	age		aaa	cta	aaq	tca		atc	ttq	acc	ctg		gtc	att	ctg	684	
														Val				
88		195					200					205						
														acc			732	
	-	Phe	Phe	Leu	Pro		Val	Val	Met	Ala	Cys 220	Cys	Tyr	Thr	Пе	11e 225		
	210	020	200	cta	ata	215	acc	ааст	aan	tct		aaa	cac	aaa	acc		780	
														Lys			, 00	
96					230				-1-	235		1			240			
98	aaa	gtg	acc	atc	act	gtc	ctg	acc	gtc	ttt	gtc	ttg	tct	cag	ttt	ccc	828	
	-	Val	Thr			Val	Leu	Thr			Val	Leu	Ser	Gln		Pro		
100				245					250					255			0.7	
																g ttc : Phe	87	t
103	-	ASI	260		: ьес	Leu	Val	265		. 116	: ASI	) ATO	270		ne	. File		
		tcc			qcc	qtt	tec			att	gad	ato			cag	gtc	92	4
																ı Val		
108		275					280					285						
																tat	972	2
	Thr 290		Thi	: IIe	e Ala	. Pne 295		H15	s ser	Cys	з ьег 30(		Pro	o vai	. Let	1 Tyr 305		
			ato	r aat				cac	can	r dat			r aaa	acc	cto	gaag	1020	c
																Lys		•
116				•	310			-	•	315			-		320			
																g aga	1068	8
		Leu	Gly	-		Ser	Glr	Ala		_	val	Ser	Phe			, Arg		
120				325					330		+.	. ~~~		335			1116	_
																gga Gly	111	Ų
124		. Ory	340			Lea	001	345					350			0-1		
		ctc	tcc	cto	tga	ggg	gtct	tct	ctga	ggtg	ıca t	ggtt	cttt	t gg	aaga	aatg	117	1
127	Ala	Leu	Ser	Leu	ı *													
128		355															100	
	_			_	-			_		-		_	-	-	-	aagaa		
		_	-			_			-		-	_	-			aagca gatgc		
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	- 5			5	7-22	0	9 5				,,-,	,		, ,	- , -			

RAW SEQUENCE LISTING DATE: 10/11/2000 PATENT APPLICATION: US/09/522,752 TIME: 10:58:23

Input Set : A:\1855.1064003.TXT

Output Set: N:\CRF3\10112000\I522752.raw

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                                                                              1531
136 ctgctacaga ccgcaaaagc agaaagtttc gtgaaaatgt ccatctttgg gaaattttct
                                                                              1591
137 accetgetet tgageetgat aacceatgee aggtettata gatteetgat etagaacett
138 tocaggoaat ctcagaccta attteettet gtteteettg ttetgttetg ggccagtgaa
139 ggtccttgtt ctgattttga aacgatctgc aggtcttgcc agtgaacccc tggacaactg
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140 accacacca caaggcatec aaagtetgtt ggettecaat ecatttetgt gteetgetgg
141 aggttttaac ctagacaagg attccgctta ttccttggta tggtgacagt gtctctccat
                                                                              1891
                                                                              1951
142 ggcctgagca gggagattat aacagctggg ttcgcaggag ccagccttgg ccctgttgta
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143 ggcttgttct gttgagtggc acttgctttg ggtccaccgt ctgtctgctc cctagaaaat
144 gggctggttc ttttggccct cttctttctg aggcccactt tattctgagg aatacagtga
                                                                               2071
145 gcagatatgg gcagcagcca ggtagggcaa aggggtgaag cgcaggcctt gctggaaggc
                                                                              2131
146 tatttacttc catgettete ettttettae tetatagtgg caacatttta aaagetttta
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147 acttagagat taggctgaaa aaaataagta atggaattca cctttgcatc ttttgtgtct
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148 ttcttatcat gatttggcaa aatgcatcac ctttgaaaat atttcacata ttggaaaagt
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149 gctttttaat gtgtatatga agcattaatt acttgtcact ttctttaccc tgtctcaata
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150 ttttaagtgt gtgcaattaa agatcaaata gatacattaa gagtgtgaag gctggtctga
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151 aggtagtgag ctatctcaat cggattgttc acactcagtt acagattgaa ctccttgttc
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165 Gln Phe Ala Ser His Phe Leu Pro Pro Leu Tyr Trp Leu Val Phe Ile
166 35 40 45
167 Val Gly Ala Leu Gly Asn Ser Leu Val Ile Leu Val Tyr Trp Tyr Cys
168 50 55 60
169 Thr Arg Val Lys Thr Met Thr Asp Met Phe Leu Leu Asn Leu Ala Ile
170 65 70 75 80
171 Ala Asp Leu Leu Phe Leu Val Thr Leu Pro Phe Trp Ala Ile Ala Ala 172 \phantom{\bigg|}85\phantom{\bigg|}90\phantom{\bigg|}95\phantom{\bigg|}
173 Ala Asp Gln Trp Lys Phe Gln Thr Phe Met Cys Lys Val Val Asn Ser
174 100 105 110
175 Met Tyr Lys Met Asn Phe Tyr Ser Cys Val Leu Leu Ile Met Cys Ile
176 115 120 125
177 Ser Val Asp Arg Tyr Ile Ala Ile Ala Gln Ala Met Arg Ala His Thr
178 130 135 140
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179 Trp Arg Glu Lys Arg Leu Leu Tyr Ser Lys Met Val Cys Phe Thr Ile
180 145 150 160
181 Trp Val Leu Ala Ala Ala Leu Cys Ile Pro Glu Ile Leu Tyr Ser Gln 182 165 170 175
183 Ile Lys Glu Glu Ser Gly Ile Ala Ile Cys Thr Met Val Tyr Pro Ser
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PATENT APPLICATION: US/09/522,752 TIME: 10:58:23 Input Set : A:\1855.1064003.TXT Output Set: N:\CRF3\10112000\I522752.raw 185 Asp Glu Ser Thr Lys Leu Lys Ser Ala Val Leu Thr Leu Lys Val Ile 195 200 187 Leu Gly Phe Phe Leu Pro Phe Val Val Met Ala Cys Cys Tyr Thr Ile 210 215 220 188 189 Ile Ile His Thr Leu Ile Gln Ala Lys Lys Ser Ser Lys His Lys Ala 230 235 190. 225 191 Leu Lys Val Thr Ile Thr Val Leu Thr Val Phe Val Leu Ser Gln Phe 245 .250 255 192 193 Pro Tyr Asn Cys Ile Leu Leu Val Gln Thr Ile Asp Ala Tyr Ala Met 265 270 194 260 195 Phe Ile Ser Asn Cys Ala Val Ser Thr Asn Ile Asp Ile Cys Phe Gln 275 280 285 197 Val Thr Gln Thr Ile Ala Phe Phe His Ser Cys Leu Asn Pro Val Leu 290 295 300 199 Tyr Val Phe Val Gly Glu Arg Phe Arg Arg Asp Leu Val Lys Thr Leu 310 315 200 305 201 Lys Asn Leu Gly Cys Ile Ser Gln Ala Gln Trp Val Ser Phe Thr Arg 202 325 330 335 203 Arg Glu Gly Ser Leu Lys Leu Ser Ser Met Leu Leu Glu Thr Thr Ser 204 340 345 205 Gly Ala Leu Ser Leu 206 355 208 <210> SEQ ID NO: 3 209 <211> LENGTH: 26 210 <212> TYPE: PRT 211 <213> ORGANISM: Artificial Sequence 213 <220> FEATURE: 214 <223> OTHER INFORMATION: NH2-Terminal Peptide of Human GPR-9-6 217 <400> SEQUENCE: 3 218 Met Ala Asp Asp Tyr Gly Ser Glu Ser Thr Ser Ser Met Glu Asp Tyr 219 1 10 15 220 Val Asn Phe Asn Phe Thr Asp Phe Tyr Cys 221 20 25 223 <210> SEQ ID NO: 4 224 <211> LENGTH: 35 225 <212> TYPE: DNA 226 <213> ORGANISM: Artificial Sequence 228 <220> FEATURE: 229 <223> OTHER INFORMATION: Oligonucleotide primer 233 <400> SEQUENCE: 4 234 togaagggat coctaacatg gotgatgact atggc

RAW SEQUENCE LISTING

DATE: 10/11/2000

35

35

236 <210> SEQ ID NO: 5 237 <211> LENGTH: 35 238 <212> TYPE: DNA

241 <220> FEATURE:

246 <400> SEQUENCE: 5

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242 <223> OTHER INFORMATION: Oligonucleotide primer

Input Set : A:\1855.1064003.TXT Output Set: N:\CRF3\10112000\1522752.raw 249 <210> SEQ ID NO: 6 250 <211> LENGTH: 30 251 <212> TYPE: DNA 252 <213> ORGANISM: Artificial Sequence 254 <220> FEATURE: 255 <223> OTHER INFORMATION: Oligonucleotide primer 259 <400> SEQUENCE: 6 30 260 tcgaagaagc ttatgaacct gtggctcctg 262 <210> SEQ ID NO: 7 263 <211> LENGTH: 30 264 <212> TYPE: DNA 265 <213> ORGANISM: Artificial Sequence 267 <220> FEATURE: 268 <223> OTHER INFORMATION: Oligonucleotide primer 272 <400> SEQUENCE: 7 30 273 aagaagtcta gatcacagtc ctgaattagc 275 <210> SEQ ID NO: 8 276 <211> LENGTH: 879 277 <212> TYPE: DNA 278 <213> ORGANISM: Homo sapiens 280 <400> SEQUENCE: 8 281 atgaacctgt ggctcctggc ctgcctggtg gccggcttcc tgggagcctg ggcccccgct 282 gtccacaccc aaggtgtctt tgaggactgc tgcctggcct accactaccc cattgggtgg 120 180 283 gctgtgctcc ggcgcgcctg gacttaccgg atccaggagg tgagcgggag ctgcaatctg 284 cctgctgcga tattctacct ccccaagaga cacaggaagg tgtgtgggaa ccccaaaagc 285 agggaggtgc agagagccat gaagctcctg gatgctcgaa ataaggtttt tgcaaagctc 300 286 caccacaaca ygcagacett ccaagcagge ceteatgetg taaagaagtt gagttetgga 287 aactccaagt tatcatcatc caagtttagc aatcccatca gcagcagcaa gaggaatgtc 420 288 tccctcctga tatcagctaa ttcaggactg tgagccggct catttctggg ctccatcggc 540 289 acaggaggg ccggatcttt ctccgataaa accgtcgccc tacagaccca gctgtcccca 600 290 egectetgte ttttgggtca agtettaate eetgeacetg agttggteet eeetetgeac 660 291 ccccaccacc tectgecegt etggeaactg gaaagaagga gttggeetga ttttaacett 720 292 ttgccgctcc ggggaacagc acaatcctgg gcagccagtg gctcttgtag agaaaactta 780 293 ggatacetet eteaetttet gtttettgee gteeaeceeg ggeeatgeea gtgtgteete 294 tgggtcccct ccaaaaatct ggtcattcaa ggatcccctc ccaaggctat gcttttctat 840 879 295 aacttttaaa taaaccttgg ggggtgaatg gaataaaaa 297 <210> SEQ ID NO: 9 298 <211> LENGTH: 150 299 <212> TYPE: PRT 300 <213> ORGANISM: Homo Sapiens 302 <220> FEATURE: 303 <221> NAME/KEY: VARIANT 304 <222> LOCATION: (104)...(104) 305 <223> OTHER INFORMATION: Xaa= Met or Thr 307 <400> SEQUENCE: 9 308 Met Asn Leu Trp Leu Leu Ala Cys Leu Val Ala Gly Phe Leu Gly Ala 309 1 10 15 310 Trp Ala Pro Ala Val His Thr Gln Gly Val Phe Glu Asp Cys Cys Leu 20

RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/522,752

DATE: 10/11/2000

TIME: 10:58:23



## Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

VERIFICATION SUMMARY PATENT APPLICATION: US/09/522,752 DATE: 10/11/2000 TIME: 10:58:24

Input Set : A:\1855.1064003.TXT
Output Set: N:\CRF3\10112000\I522752.raw

L:15 M:271 C: Current Filing Date differs, Replaced Current Filing Date L:320 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9 L:374 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:11